

Sherman Reservoir

2009 Fall Survey Summary



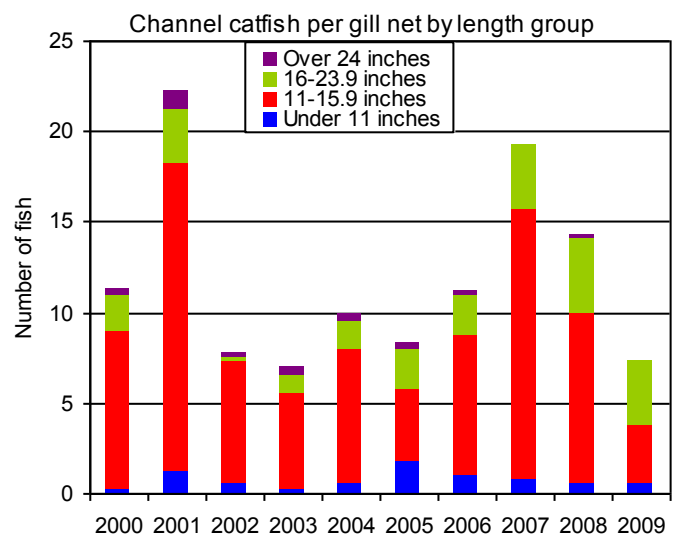
Brad Eifert, Fisheries Biologist

The following text and graphs are the result of netting surveys completed during September 2009 at Sherman Reservoir. For comparative purposes it also shows results from previous years. Fish populations are sampled each fall at Sherman using gill and frame nets. Gill nets are used to sample fish species found primarily in open water, such as walleye, while frame nets are used to sample shoreline oriented species, such as crappie. The nets are set each year at approximately the same locations and dates as previous years. This reduces variability and allows for trend comparisons of species abundance and size distribution. The following graphs show the total number of fish caught per net and the relative abundance of fish within several length categories. The text provides a brief explanation of the information shown in the graphs.

Channel Catfish

The gill net catch of channel catfish continued a downward trend, as the 2009 catch dropped to seven fish per net. This is a 50% reduction from 2008 results and is slightly below the ten year average of 12 fish/net. The size structure was similar to past years, with most of the catfish ranging from 11 to 18 inches. The length of the average catfish was 15.6 inches, which was unchanged from 2008 results. Normally, a few catfish greater than 24 inches are sampled, but none were collected last fall at Sherman.

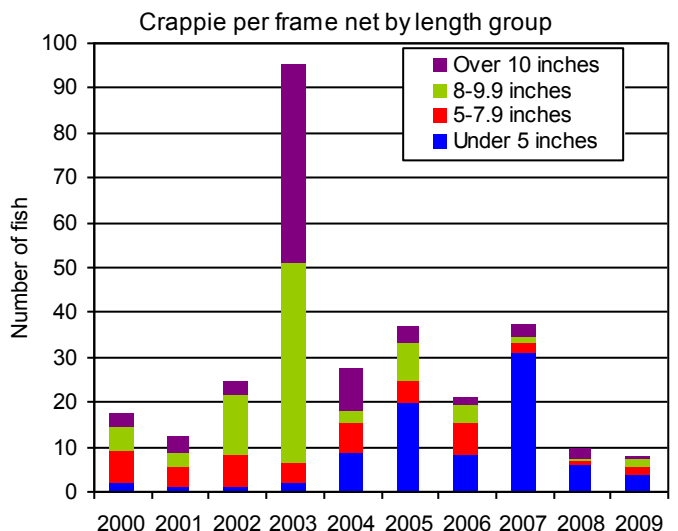
Although catfish numbers appear to be lower, Sherman should still provide decent fishing opportunities for 14 to 18 inch channel catfish. Large fish also appear to be less abundant, which will make catching trophy catfish more of a challenge.



Crappie

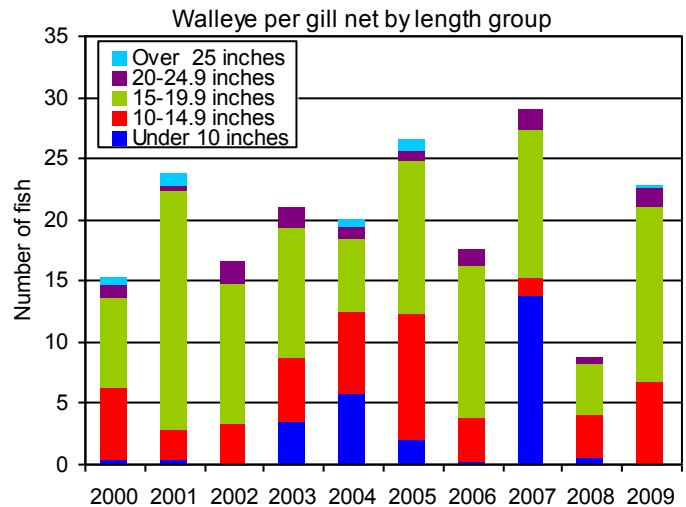
Crappie catch rates continue to be well below average at Sherman. While the catch of young-of-the-year crappie has been good the past five years, the catch of fish greater than five inches has been poor since 2007. Excluding young-of-the-year catch, most of the crappie sampled ranged from five to nine inches. The number of fish larger than 10 inches was the lowest caught during the past ten years. There were only four year classes of crappie collected (age-0 through age-3) and the average length of sampled crappie was 5.6 inches. Crappie production has been consistent the past five years, but recruitment has been below average. Lower than normal winter reservoir levels due to the drawdown required for completion of the Aquatic Habitat Project may have contributed to poor recruitment. Now that winter reservoir levels are back to normal, it is hoped that recruitment will improve.

Lower crappie abundance and fewer fish greater than 10 inches could make crappie fishing more difficult this year at Sherman Reservoir.



Walleye

Walleye abundance showed signs of improvement, as the catch increased to 23 fish per net. The majority of the sampled fish ranged from 10 to 20 inches, but promising increases were also seen in abundance of fish greater than 20 inches. The 2008 year-class looks to have recruited successfully, providing the highest catch of 10 to 15 inch walleye in several years. The 15 to 20 inch size category received a large influx of fish from the very strong 2007 year-class, which currently range from 14 to 16.5 inches. These walleye will provide excellent harvest opportunities for the next couple years. While the 2006 year-class is not contributing much to the fishery, good year-classes produced during 2003 to 2005 are providing the bulk of the larger fish present in the population. Fish from these three age classes range from 16.5 to 22 inches. For the first time since 2005, there were some fish greater than 25 inches sampled. The average walleye collected was 15.7 inches and the largest was 28 inches.



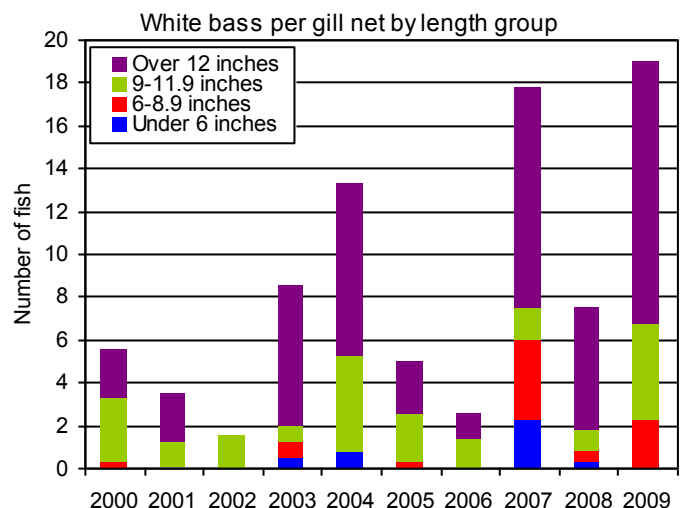
While it is too soon to evaluate impacts from the new regulations at Sherman, early results look promising. The new regulation has allowed for increased angler catch and harvest at Sherman. Based on the 2009 angler survey, the total catch of 26,800 walleye was the second highest recorded at Sherman and the harvest of 5,400 walleye was more than twice the normal harvest at Sherman. Although harvest was high, there still appears to be adequate numbers of fish available in the harvest window. Roughly, 63% of the fish sampled were in the 15 to 20 inch size category. Consistent recruitment is one critical component of making this regulation successful and it looks like there is another strong year class which will recruit into the harvest slot during the next year. While there was a modest increase in the abundance of walleye greater than 20 inches, additional time will be needed to determine impacts on these larger fish.

Walleye anglers should have excellent walleye fishing during 2010 at Sherman Reservoir. Survey results indicate high numbers of walleye currently available in the 15 to 20 inch harvest slot. In addition, good numbers of smaller fish, as well as an increasing number of fish greater than 20 inches will provide great catch and release opportunities. Anglers are reminded that they are allowed a daily bag limit of 2 walleyes greater than 15 inches but less than 20 inches and one walleye greater than 28 inches. Walleye from 20 to 28 inches are protected and must be released.

White Bass

White bass abundance was excellent, as the catch of 19 fish/net was the highest recorded during the past ten years. The trend of large white bass continues, as 65% of the sample consisted of fish larger than 12 inches. The high abundance of white bass can be contributed to consistent recruitment during the past several years, as seven year-classes were sampled. Age-2 fish were most abundant, ranging from 11 to 12.5 inches. Age-4 and age-5 bass were also abundant and comprised most of the fish over 12 inches. These two age-classes ranged from 13 to 15 inches. The average length of white bass collected during the survey was 12.0 inches and several fish larger than 15 inches were caught.

With the current white bass population, anglers should experience very good success during 2010 at Sherman. Great opportunities exist for white bass up to 14 inches.



Sherman Reservoir — Additional Information

Fisheries Division will likely be conducting **walleye spawn** collections at Sherman during 2010. Depending on weather conditions, spawn collection will begin the last week of March or the first week of April and normally lasts for one to two weeks. Walleye are collected along the dam at night and disturbance to anglers is minimal. During 2009, seven nights of walleye egg collection were completed, with 85 quarts of eggs collected.

Anglers should also be aware that the water within 150 feet of the dam and the new walleye spawning reef near the west end of the dam is closed to all fishing from sunset to sunrise beginning April 1 and ending April 20.

Current **lake elevations** can be found on Farwell Irrigation District's website: <http://www.farwellid.com/index.html>

Boaters at Sherman Reservoir are reminded to use caution to avoid the rock structures placed in the reservoir, especially during high water when structures may be partially under water. White posts with reflective tape mark all structures, with buoys and lights added at some sites.

A **research project** involving a graduate student from the University of Nebraska-Kearney and staff from the Game and Parks Commission evaluating walleye spawning success and the effectiveness of walleye spawning reefs at Sherman Reservoir was completed during 2009. Results indicate that walleye preferred the cobble spawning reefs to mud substrates and that eggs were deposited on the reefs.

An **angler survey** will be completed at Sherman Reservoir from April through October 2010. This survey is done in cooperation with the University of Nebraska-Lincoln Fish and Wildlife Coop Unit. The survey has been on-going since 1996 and has provided valuable information on angling pressure, catch rates, harvest rates. Anglers are encouraged to take the time to answer the questions from the creel clerks.

Fish stocking in 2009 consisted of 150,400 walleye fingerlings and 700 ten-inch northern pike. Fish stocking in 2010 will include 140,000 walleye fingerlings.

A detailed **bathymetric map** of Sherman Reservoir can be found on Nebraska Game and Parks Commission website: <http://www.ngpc.state.ne.us/fishing/programs/lakemapping/pdfs/sherman.pdf>



For additional information about fisheries management at Sherman Reservoir please contact the NGPC Kearney office at 308-865-5310 or by email at the addresses listed below.

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